And I want you to fight for it because it's right for you.

Thank you, and God bless you all.

NOTE: The President spoke at 8:15 p.m. in the Westin Galleria Hotel. In his remarks, he referred to former Secretary of the Treasury Lloyd Bentsen and his wife, B.A.; former Texas Governors Ann Richards and Mark White; Texas Attorney General Dan Morales and former Texas Attorney General Jim Mattox; Lt. Gov. Bob Bullock; Texas Land Commissioner Garry Mauro; and Terence McAuliffe, national finance chair, and Laura Hartigan, national finance director, Clinton/Gore '96.

Remarks on Presenting the National Medals of Science and Technology
October 18, 1995

Thank you very much, Mr. Vice President, Senator Glenn, Senator DeWine, distinguished members of our administration involved in science and technology and research and development, to our honorees, their friends, and other distinguished visitors to the White House today. I was looking at the Vice President, listening to him eloquently lay the case out and thinking to myself how fortunate we are to have a Vice President who knows so much and cares so much about these issues and wishing that you could all do something for him, those of you who are being honored today. You see, since Sunday, he has been in Haiti, Texas, and Tennessee, and I have been in Connecticut, Texas, California, Texas, and back here. And what we need is some nonbiologically damaging way to stay awake and on the job today. If any of you could come up with an idea before you leave today with your medals, we would be immensely grateful to you. [*Laughter*]

Today it is a great honor for both the Vice President and me to honor outstanding Americans whose contributions to science and technology have enriched not only the United States but the entire world. Through persistence and focused intellectual energy, they have stretched our horizons, expanded the frontiers of knowledge, peeled away the secrets of nature, cured disease, created new industries such as that of optical storage. Through technologies like virtual reality, they will let doctors treat soldiers on the battlefield and let children on our prairies learn from teachers in our cities.

They have even affected the lives of people of this country in more direct ways. They have invented the adhesive used for Post-Its. All of them have performed research that will pay off richly for the United States in the 21st century. In whatever their field or specialty, their spark of genius has lighted the landscape of human knowledge and pushed back the shrouds of ignorance.

We are proud of all of you and what you have done. Your achievements give us confidence that the United States will continue to lead in science and technology for many years to come.

In a year when seven of nine Nobel laureates for science and mathematics were Americans, we can feel assured that our scientific leadership is unchallenged. We can also feel proud that every one of these Nobel Prize winners has been supported in their research efforts by the United States Government.

In honoring these pioneers, we must ask and answer a fundamental question: At the edge of the 21st century, how will we ensure that America remains the strongest nation in the world? How can we pass on to every child the American dream of opportunity?

The world is changing rapidly from the industrial to the information technology age, from the cold war to the global village. We live at a time of remarkable promise, when dazzling new technologies are poised to transform how we work, how we learn, how we get information, indeed, how we organize our patterns of living. Consider that at the turn of the century, nearly half of American people were living on farms. At the midpoint of the century, 4 of 10 of us worked in industries. At the end of this century, most of us will be knowledge workers. That remaking of the economic landscape will only accelerate in the years to come, as we morph from the machine age to the information age.

Al told me to say that. Did I do okay? [*Laughter*] You promised you wouldn't laugh if I'd say it, and then there you are. It's part of my training in virtual reality, which is becoming the norm around here. [*Laughter*]

Our ability to offer people opportunity clearly depends upon our ability to spread the fruits of our knowledge. In other words, our leadership depends upon our commitment to science, to technology, to research, to learning. We have always revered science and its implicit promise of progress. We are in a way a whole nation of inventors and explorers and tinkerers. We believe in technology, and we are determined to pursue technology in all of its manifestations. These things seem to me to be deeply embedded in our national character and our national history. We also recognize that these benefits are far from abstract, for throughout our history, from the steam engine to the telegraph, from the assembly line to the microchip, our prosperity has surged forward on wave after wave after wave of technological change. Since World War II, innovation has been responsible for clearly as much as half of our national economic growth.

The private businesses represented here today will always be the most important investors in research and development. But throughout our history, we have recognized that Government, working in partnership with the private sector, does have a critical role to play.

The defense and space programs help make America the world's leader in aircraft, aerospace, and electronics. Because our troops are equipped with the world's most sophisticated weapons, our Nation is secure. The work of the National Institutes of Health led to new drugs and therapies that have made America a leader in biotechnology. And a unique partnership between Government, business, and university researchers spawned the Internet, a pathway for knowledge and creativity, the likes of which our parents could only have imagined, and some of us who are parents today can just barely imagine. [*Laughter*] Sales of products through on-line services will soar from $200 million this year to $4.8 billion in 1998.

Today, global competition and rapid change have made technology clearly more central to our future than ever before. And because it is so often difficult for individual firms to reap the benefits of discovery and innovation, the public sector must continue to play a role.

Since I became President, I have continued this commitment to invest in science and technology. Our comprehensive economic strategy began by reducing the deficit by a trillion dollars over 7 years, which lowered the cost of capital and freed up funds for investment. But we strengthened our investments in basic science research. And we put in place pragmatic industry-led efforts such as the Commerce Department's advanced technology program, manufacturing extension programs, and our work to enhance market-led solutions to our Nation's environmental challenges.

Throughout our history, at least throughout modern history when we've been clearly aware of these scientific matters, this future and this kind of policy has been broadly supported by members of both parties. It has been a part of our national common ground, a part of our sense of who we are, what our security requires, and what will bring us the best future. Today that commitment is at risk in the great debate over balancing the Federal budget.

I have proposed a balanced budget plan that sustains our investment in scientific endeavors, in technology, in research and development. The plan now being considered by the Congress will cut vital research and development by a third and any number of other related endeavors by that much or more. We could have a balanced budget to show for it tomorrow, but a decade or a generation from now our Nation will be much the poorer for doing that.

At a time of real and crushing budget pressures, the Congress deserves credit for its commitment to balance the budget and to slow the rate of growth of medical inflation. But it is tempting to cut other things without considering what the consequences are, including investments in science and technology, which may not have the biggest lobby here in Washington.

The future, it is often said, has no constituency. But the truth is, we must all be the constituency of the future. If we want a future in which the world's libraries are at every child's fingertips, in which gene therapy enables us to cure diseases like cystic fibrosis, in which a car can travel across the country on one tankful of gas with virtually no pollution, then we must strengthen, not weaken, our investments in science, technology, and research. We must sustain our universities, a critical national resource and still the envy of the entire world. We must allow ourselves always to see the world through

fresh eyes. We must never allow those who fear change to subvert progress. And we must resist these drastic cuts, for constant churning innovation is the key to economic growth and national strength in the 21st century.

If we're going to make real the promise of the American dream to all Americans, which would plainly do a lot to help us deal with the kind of racial difficulties that we began so bravely as a nation to come to grips with this last week, we have to go further in this area.

Those of us in this room who care about science and technology, all of us have a duty to ensure that every child has the chance to take part in the new information age. Technological literacy must become the standard in our country. Computers can enrich the education of any child but only if the child has access to a computer, good software, and a competent, good teacher who can help that child learn how to use it. Preparing children for a lifetime of computer use is just as essential today as teaching basic skills was a few years ago.

Over the past month I have been gratified that so many leaders of the high-tech industry have joined with us to launch a national effort to connect every classroom by the year 2000, a plan that rests upon four pillars: modern computers in every classroom accessible to all students; connections from every classroom to the incredible educational resources flowing throughout the world; teachers in every classroom who are trained to make the most of the technology; and a rich array of educational software and information resources.

Already, significant progress is being made. In California, a voluntary private effort will provide Internet access to every elementary and secondary school by the end of the decade and will wire one out of every five classrooms by the end of this year. That is an astonishing achievement led by private sector companies in California.

These goals are important to our future. And this balanced budget debate has to be seen in that context. It is a very good thing to balance the budget if we do it in a way that is consistent with our values and our clear long-term goals of strengthening our economy, growing our middle class, shrinking our under class, keeping America the world's greatest home for entrepreneurs. If it's consistent with our values and our economic interests, that's what we ought to do. We can't do that if we destroy the public responsibility in these critical areas.

I, however, have to tell you I am basically optimistic, maybe because I am genetically programmed that way. [*Laughter*] We are going through sort of a tortured version of a scientific method now. It reminds me—I say tortured because, unlike the scientific method, it ignores the experiments of the past. [*Laughter*] But still, it's sort of like that.

And I'm reminded of what Winston Churchill said about the United States when we were trying to decide in the Congress whether to support the Lend-Lease Act and help Britain when Britain was alone in World War II. And there was a great question about whether President Roosevelt could pass the Lend-Lease Act through Congress because many thought it was a backdoor way of getting the United States into the war. And Mr. Churchill said, "I have great confidence in the judgment and the common sense of the American people and their leaders. They invariably do the right thing, after they have considered every other alternative." [*Laughter*]

So I urge you to inject some rigor into this scientific experimentation. I thank you for your achievements and your contributions. I do believe that the 21st century can be a golden age for all Americans and that we can help to lead the world to a new era of freedom and peace and prosperity, if we make the right decisions in this critical time of change.

Your very achievements, the example of your life work have increased the odds that we will do exactly that. And on behalf of all Americans, I thank you and congratulate you.

Thank you very much.

NOTE: The President spoke at 2:54 p.m. in the East Room at the White House.